



**Rules and
Regulations for
the Classification
of Ships, July 2011**

Notice No. 4

Effective Date of Latest
Amendments:

See page 1

Issue date: November 2011

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RULES AND REGULATIONS FOR THE CLASSIFICATION OF SHIPS, *July 2011*

Notice No. 4

This Notice contains amendments within the following Sections of the *Rules and Regulations for the Classification of Ships, July 2011*. The amendments are effective on the dates shown:

<i>Part</i>	<i>Chapter</i>	<i>Section</i>	<i>Effective date</i>
5	2	3, 12	1 January 2012
5	19	7	1 January 2012

It will be noted that the amendments also include corrigenda, which are effective from the date of this Notice.

The *Rules and Regulations for the Classification of Ships, July 2011* are to be read in conjunction with this Notice No. 4. The status of the Rules is now:

Rules for Ships	Effective date:	July 2011
Notice No. 1	Effective date:	1 July 2011
Notice No. 2	Effective date:	1 January 2012 & Corrigendum
Notice No. 3	Effective date:	1 January 2012
Notice No. 4	Effective date:	1 January 2012

Part 5, Chapter 2

Oil Engines

Effective date 1 January 2012

■ Section 3

Design

3.12 Alternative method for calculation of stress concentration factors

3.12.1 LR will give consideration to crankshaft design using an alternative method given in LR's *ShipRight procedures for alternative method for calculation of stress concentration factors in the web fillet radii of crankshafts by utilising Finite Element*.

■ Section 12

Mass produced turbo-chargers

12.3 Continuous inspection of individual units

12.3.6 Dynamic balancing and overspeed tests are to be carried out, see 10.3 and 10.4 14.3 and 14.4, in accordance with the approved procedure for quality control. If each forged wheel is individually controlled by an approved non-destructive examination method, then no overspeed test may be required except for wheels of the type test unit.

Part 5, Chapter 19

Steering Gear

Effective date 1 January 2012

■ Section 7

Testing and trials

7.2 Trials

7.2.1 The steering gear is to be tried out on the trial trip in order to demonstrate to the Surveyor's satisfaction that the requirements of the Rules have been met. The trial is to include the operation of the following:

- (a) The steering gear, including demonstration of the performances required by 2.1.2(b) and 2.1.3(b):
- For the main steering gear trial, the propeller pitch of controllable pitch propellers is to be at the maximum design pitch approved for the maximum continuous ahead RPM;
 - If the ship cannot be tested at the deepest draught, ~~alternative trial conditions may be specially considered. In this case, for the main steering gear trial, the speed of the ship corresponding to the maximum continuous revolutions of the main engine should apply;~~ then the loading condition can be accepted on the conditions that either the rudder is fully submerged (at zero speed waterline) and the vessel is in an acceptable trim condition, or the rudder load and torque at the trial loading condition have been reliably predicted and extrapolated to the full load condition, to the satisfaction of the Administration. In any case, for the main steering gear trial, the speed of the ship corresponding to the maximum continuous revolutions of main engine and maximum design pitch applies;
- (b) The steering gear power units, including transfer between steering gear power units;

- (c) The isolation of one power actuating system, checking the time for regaining steering capability;
- (d) The hydraulic fluid recharging system;
- (e) The emergency power supply required by 6.1.1;
- (f) The steering gear controls, including transfer of control and local control;
- (g) The means of communication between the steering gear compartment and the wheelhouse, also the engine room, if applicable;
- (h) The alarms and indicators;
- (j) Where the steering gear is designed to avoid hydraulic locking this feature shall be demonstrated.
- Test items (d), (g), (h) and (j) may be effected at the dockside.

7.2.2 The ability of the machinery to reverse the direction of propeller thrust in sufficient time and bring the ship to rest within a reasonable distance from maximum ahead service speed is to be demonstrated and recorded.

7.2.3 The stopping times, ship headings and distances recorded on trials, together with the results of trials to determine the ability of ships having multiple propellers to navigate and manoeuvre with one or more propellers inoperative, shall be available on board for the use of the Master or designated personnel.

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